SYSTEM AND METHOD FOR ADDRESSING MEMORY AND TRANSFERRING DATA

Abstract

A system and method for addressing memory and transferring data, which in some embodiments include one or more processor translation look-aside buffers (TLBs) and optionally one or more I/O TLBs, and/or a block transfer engine (BTE) that optionally includes a serial cabinet-to-cabinet communications path (MLINK). In some embodiments, the processor TLBs are located within one or more common memory sections, each memory section being connected to a plurality of processors, wherein each processor TLB is associated with one of the processors. The BTE performs efficient memory-to-memory data transfers without further processor intervention. The MLINK extends the BTE functionality beyond a single cabinet.